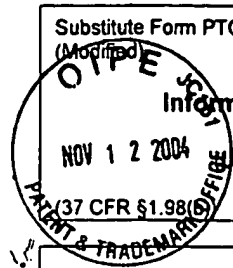


Substitute Form PTO-1449 (Modified)	U.S. Department of Commerce Patent and Trademark Office	Attorney's Docket No. 17601-032002	Application No. 10/777,503
<b>Information Disclosure Statement by Applicant</b> (Use several sheets if necessary)		Applicant Joseph A. Zupanick	
		Filing Date February 11, 2004	Group Art Unit 3672

**U.S. Patent Documents**

Examiner Initial	Desig. ID	Document Number	Publication Date	Patentee	Class	Subclass	Filing Date If Appropriate
12	A1	3,744,565	07/10/1973	Brown			
g	A2	4,060,130	11/29/1977	Hart			
g	A3	2002/0043404 A1	04/18/2002	Trueman et al.			

**Foreign Patent Documents or Published Foreign Patent Applications**

Examiner Initial	Desig. ID	Document Number	Publication Date	Country or Patent Office	Class	Subclass	Translation	
							Yes	No
3	B1	EP 1 316 673 A2	06/04/2003	EPO			N/A	
3	B2	SU-876968	10/30/1981	Russia				X

**Other Documents (include Author, Title, Date, and Place of Publication)**

Examiner Initial	Desig. ID	Document
3	C1	Notification of Transmittal of the International Search Report and the Written Opinion of the International Searching Authority, or the Declaration (3 pages), International Search Report (5 pages) and Written Opinion of the International Searching Authority (6 pages) re International Application No. PCT/US2004/012029 mailed September 22, 2004
	C2	Brunner, D.J. and Schwoebel, J.J., "Directional Drilling for Methane Drainage and Exploration in Advance of Mining," REI Drilling Directional Underground, World Coal, 1999, 10 pages
	C3	Thakur, P.C., "A History of Coalbed Methane Drainage From United States Coal Mines," 2003 SME Annual Meeting, February 24-26, Cincinnati, Ohio, 4 pages
	C4	U.S. Climate Change Technology Program, "Technology Options for the Near and Long Term," 4.1.5 Advances in Coal Mine Methane Recovery Systems, pp. 162-164
	C5	Notification of Transmittal of the International Search Report and the Written Opinion of the International Searching Authority, or the Declaration (3 pages), International Search Report (3 pages) and Written Opinion of the International Searching Authority (7 pages) re International Application No. PCT/US2004/017048 mailed October 21, 2004
	C6	Gardes, Robert, "Multi-Seam Completion Technology," Natural Gas Quarterly, E&P, June 2004, pp. 78-81
	C7	Baiton, Nicholas, "Maximize Oil Production and Recovery," Vertizontal Brochure, received 10/2/2002, 4 pages
3	C8	Dreiling, Tim, McClelland, M.L. and Bilyeu, Brad, "Horizontal & High Angle Air Drilling in the San Juan Basin, New Mexico," Dated on or about 3/6/2003, pp. 1-11

Examiner Signature 	Date Considered 1/6/05
EXAMINER: Initials citation considered. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.	

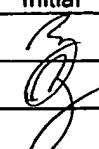
Substitute Form PTO-1449 (Modified)	U.S. Department of Commerce Patent and Trademark Office	Attorney's Docket No. 17601-032002	Application No. 10/777,503
<b>Information Disclosure Statement by Applicant</b> (Use several sheets if necessary) (37 CFR §1.98(b))		Applicant Joseph A. Zupanick	
		Filing Date February 11, 2004	Group Art Unit 3672

Other Documents (include Author, Title, Date, and Place of Publication)		
Examiner Initial	Desig. ID	Document
	C9	Fong, David K., Wong, Frank Y., and McIntyre, Frank J., "An Unexpected Benefit of Horizontal Wells on Offset Vertical Well Productivity in Vertical Miscible Floods," Canadian SPE/CIM/CANMET Paper No. HWC94-09, paper to be presented March 20-23, 1994, Calgary, Canada, 10 pages
	C10	Fischer, Perry A., "What's Happening in Production," World Oil, June 2001, p. 27
	C11	Website of PTTC Network News Volume 7, 1 <sup>st</sup> Quarter 2001, Table of Contents, <a href="http://www.pttc.org/./news/v7n1nn4.htm">http://www.pttc.org/./news/v7n1nn4.htm</a> printed 04/25/2003, 3 pages
	C12	Cox, Richard J.W., "Testing Horizontal Wells While Drilling Underbalanced," Delft University of Technology, August 1998, 68 pages
	C13	McLennan, John, et al., "Underbalanced Drilling Manual," Gas Research Institute, Chicago, Illinois, GRI Reference No. GRI-97/0236, copyright 1997, 502 pages
	C14	The Need for a Viable Multi-Seam Completion Technology for the Powder River Basin, Current Practice and Limitations, Gardes Energy Services, Inc., Believed to be 2003 (8 pages)

Examiner Signature 	Date Considered 1/16/05
EXAMINER: Initials citation considered. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.	

Substitute Form PTO-1449 (Rev. 10-1-03)	U.S. Department of Commerce Patent and Trademark Office	Attorney's Docket No. <b>17601-032002</b>	Application No. <b>10/777,503</b>
<b>Information Disclosure Statement</b> <b>by Applicant</b> (Use several sheets if necessary)		Applicant <b>Joseph A. Zupanick</b>	
		Filing Date <b>February 11, 2004</b>	Group Art Unit <b>3672</b>

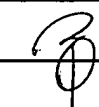

**U.S. Patent Documents**

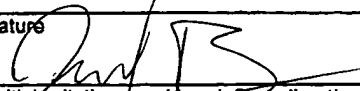
Examiner Initial	Desig. ID	Document Number	Publication Date	Patentee	Class	Subclass	Filing Date If Appropriate
	A1	4,417,829	11/29/1983	Berezoutzky			
	A2	6,237,284	05/29/2001	Erickson			
	A3						
	A4						
	A5						
	A6						
	A7						
	A8						
	A9						

**Foreign Patent Documents or Published Foreign Patent Applications**

Examiner Initial	Desig. ID	Document Number	Publication Date	Country or Patent Office	Class	Subclass	Translation	
							Yes	No
	B1							
	B2							
	B3							
	B4							
	B5							

**Other Documents (include Author, Title, Date, and Place of Publication)**

Examiner Initial	Desig. ID	Document
	C1	Langley, Diane, "Potential Impact of Microholes Is Far From Diminutive," JPT Online, <a href="http://www.spe.org/spe/jpt/jps">http://www.spe.org/spe/jpt/jps</a> , November 2004 (5 pages)
	C2	Consol Energy Slides, "Generating Solutions, Fueling Change," Presented at Appalachian E&P Forum, Harris Nesbitt Corp., Boston, October 14, 2004 (29 pages)
	C3	Notification of Transmittal of the International Search Report and the Written Opinion of the International Searching Authority, or the Declaration (3 pages), International Search Report (3 pages), and Written Opinion of the International Searching Authority (5 pages) re International Application No. PCT/US2004/024518 mailed November 10, 2004
	C4	

Examiner Signature 	Date Considered <b>1/10/05</b>
EXAMINER: Initials citation considered. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.	

Substitute Form PTO-1449 (Modified)	U.S. Department of Commerce Patent and Trademark Office	Attorney's Docket No. 17601-032002	Application No. 10/777,503
<b>Information Disclosure Statement by Applicant</b> (Use several sheets if necessary) (37 CFR §1.98(b))		Applicant, <b>Joseph A. Zupanick</b>	
		Filing Date February 11, 2004	Group Art Unit 3672

**U.S. Patent Documents**

Examiner Initial	Desig. ID	Document Number	Publication Date	Patentee	Class	Subclass	Filing Date If Appropriate
<i>[Signature]</i>	A1	2004/0226719 A1	11/18/2004	Morgan et al.			
	A2						
	A3						
	A4						
	A5						
	A6						
	A7						
	A8						
	A9						

**Foreign Patent Documents or Published Foreign Patent Applications**

Examiner Initial	Desig. ID	Document Number	Publication Date	Country or Patent Office	Class	Subclass	Translation	
							Yes	No
	B1							
	B2							
	B3							
	B4							
	B5							

**Other Documents (include Author, Title, Date, and Place of Publication)**

Examiner Initial	Desig. ID	Document
<i>[Signature]</i>	C1	Schenk, Christopher J., "Geologic Definition and Resource Assessment of Continuous (Unconventional) Gas Accumulations - the U.S. Experience," Website, <a href="http://aapg.confex.com/.../">http://aapg.confex.com/.../</a> , printed November 16, 2004 (1 page)
<i>[Signature]</i>	C2	U.S. Department of Interior, U.S. Geological Survey, "Characteristics of Discrete and Basin-Centered Parts of the Lower Silurian Regional Oil and Gas Accumulation, Appalachian Basin: Preliminary Results From a Data Set of 25 oil and Gas Fields," U.S. Geological Survey Open-File Report 98-216, Website, <a href="http://pubs.usgs.gov/of/1998/of98-216/introl.htm">http://pubs.usgs.gov/of/1998/of98-216/introl.htm</a> , printed November 16, 2004 (2 pages)
	C3	

Examiner Signature <i>[Signature]</i>	Date Considered 1/6/05
EXAMINER: Initials citation considered. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.	